

COFFEE PRO PROFESSIONAL SIEVE ANALYSIS KIT FOR COFFEE GRIND ANALYSIS AND BEAN GRADING

The new Coffee Pro Portable Sieve Analysis Kit includes the worlds first truly portable laboratory grade sieve shaker, designed for use in the field. Equipped with a full set of Endecotts Certified Brass Grind Analysis Sieves in ASTM Designations #12, #16, #20, #30, #40, #50, along with receiving pan, lid, and 500 gram pocket balance, all neatly packed in a hard plastic carrying case.



MAINTENANCE FREE

ELECTROMAGNETIC VIBRATION

ANTIVIBRATION FEET

0-60 MINUTE TIMER

VARIABLE AMPLITUDE

SIMPLE CLAMPING SYSTEM

ACCOMODATES (6) 100 mm HALF HEIGHT SIEVES OR (3) 100 mm FULL HEIGHT SIEVES

DIMENSIONS

M100 Shaker
26cm x 16 cm x 32cm

CASE
19" x 17" x 8"

PACKED WEIGHT
25 lbs

POWER SUPPLY
230 V 50 HZ
115 V 60 HZ

This popular grind distribution chart shows the optimal percentage of grinds to be retained on each of the sieves listed, for each of the brew types, according to research done by the coffee brewing institute, and later revised by MPE in Chicago.

ASTM #	GRIND TYPE					EUROPEAN			
	E.P.	REGULAR	ADC	DRIP	FINE	VENDING	COARSE	MEDIUM	FINE
% RETAINED No. 12/16 SIEVES	35%	27%	17%	8%	2%		NA	NA	NA
% RETAINED No. 20/30 SIEVES	42%	60%	65%	65%	62%	10%	NA	NA	NA
% RETAINED No. 40 SIEVE	NA	NA	NA	NA	NA	35%	NA	50%	65%
% RETAINED No. 50 SIEVE	NA	NA	NA	NA	NA	35%	NA	20%	32%
% RETAINED PAN	13%	13%	18%	27%	36%	20%	52%	20%	32%

Other studies suggest it is important to ensure that the fines (Amount passing the # 50 sieve) do not exceed 20percent, because amounts over that have been found to produce a bitter taste.

Whenever the case, the particle size distribution of the finished ground coffee will have a significant bearing on the taste, because as the grind size is reduced, the relative surface area of the grinds is increased. Smaller grinds require less contact time with water to achieve optimal extractions. This is why Espresso has such a relatively short contact time. As the burrs on a grinder wear out, the particle size distribution will change, as will the characteristics of the final product, unless a grind analysis program is instituted.

Grind analysis as a quality control measure in remote locations like cafes, has always been a problem without a solution. Hand shakers are difficult to operate, and inaccurate. Standard sieve shakers weigh hundreds of pounds, or are too bulky to tote around.

The M100 Sieve Shaker is a laboratory grade sieve shaker, utilizing an electro-magnetic motor to provide agitation. The amplitude may be varied, as well as the cycle time, helping to ensure accurate particle size analysis.